

Amendments of the Claims:

A detailed listing of all claims in the application is presented below. This listing of claims will replace all prior versions, and listings, of claims in the application. All claims being currently amended are submitted with markings to indicate the changes that have been made relative to immediate prior version of the claims. The changes in any amended claim are being shown by strikethrough (for deleted matter) or underlined (for added matter).

1. (Currently Amended) Method of making a ferrous article of high serviceability comprising
 - (a) forming said ferrous article
 - (b) austenitizing said ferrous article at a temperatures between 1450-1750°F
 - (c) quickly transferring said ferrous article to a thermal bath
 - (d) holding said ferrous article in said thermal bath at least 20°F but no more than 500°F above M_s for a period from 10 minutes to three hours whereby said ferrous article comprises austenite and at least 60% bainite
 - (e) quenching said ferrous article in a bath at ambient temperatures to convert substantially all of the ~~remaining~~ austenite remaining to martensite, and
 - (f) plastically deforming said article.
2. (Original) Method of claim 1 wherein said ferrous article is a steel article.
3. (Original) Method of claim 1 wherein step (f) is conducted by cold working.
4. (Original) Method of claim 1 wherein step (f) is conducted by cold working.
5. (Original) Method of claim 1 wherein step (c) is conducted in sixty seconds or less.
6. (Original) Method of claim 1 wherein step (c) is conducted in twenty seconds or less.
7. (Original) Method of claim 1 wherein step (f) comprises both compression deformation and tensile deformation.

8. (Original) Method of claim 7 wherein said plastic deformation is conducted to at least 60% of the yield strength of said article.
9. (Original) Method of claim 7 wherein said compression deformation comprises shot peening.
10. (Original) Method of claim 7 wherein said compression deformation comprises the application of compressive stress in the range of -50,000 psi to -200,000psi.
11. (Currently Amended) 11. Method of claim 7 wherein the tensile deformation comprises dynamic stress to at least 60% of yield strength.
12. (Currently Amended) 12. Method of making a steel chain link of high serviceability comprising
- (a) forming said steel chain link of steel
 - (b) austenitizing said steel chain link at a temperatures between 1450-1750°F
 - (c) transferring said steel chain link to a thermal bath in a period less than 60 seconds
 - (d) holding said steel chain link in said thermal bath at least 20°F but no more than 500°F above M_s for a period from 10 minutes to three hours whereby said steel chain link comprises austenite and at least 60% bainite
 - (e) quenching said steel chain link in a bath to convert substantially all of the ~~remaining~~ austenite remaining to martensite, and
 - (f) plastically deforming said steel chain link by
 - (i) compression deformation and
 - (ii) tensile deformation to at least 60% of its yield strength.
13. (Withdrawn).
14. (Withdrawn).

15. (Withdrawn).

16. (Withdrawn).

17. (Original) Method of claim 12 wherein said compression deformation comprises ball peening.

18. (Original) Method of claim 12 wherein said compression deformation comprises the application of compressive stress in the range of -50,000psi to -200,000psi.

19. (Original) Method of claim 12 wherein said tensile deformation is applied to said chain link as a part of a chain.

20. (Original) Method of claim 12 wherein step c is performed in 20 seconds or less.

21. (New) Method of claim 1, wherein said ferrous article is a steel chain link.